

Safety data sheet
complying with Regulation 1907/2006/EC (REACH Regulation),
EU 2020/878 and Regulation No 1272/2008/EC (CLP)

Printing date 03.06.2021

Version number 4 (replaces version 3)

Revision: 03.06.2021

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SECTION 1: Identification of the substance/mixture and of the company/undertaking**1.1 Product identifier****Trade name:** PENESIL SILOX™**UFI:** R740-204W-300C-8QDG**1.2 Relevant identified uses of the substance or mixture and uses advised against**

No further relevant information available.

Application of the substance / the mixture: Silane-Siloxane water repellent**1.3 Details of the supplier of the safety data sheet****Manufacturer/Supplier:**

PENETRON HELLAS S.A. G.E.MH. No: 07278001000

50, THRAKOMAKEDONON AV., 136 79 ACHARNES, GREECE

TEL.: +30 210 2448250 - FAX: + 30 210 2476803

Email: info@penetron.gr Site: www.penetron.gr

1.4 Emergency telephone number:

European Emergency Tel.: 112

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SECTION 2: Hazards identification**2.1 Classification of the substance or mixture****Classification according to Regulation EC No 1272/2008 CLP:**

GHS02 flame

Flam. Liq. 3

H226 Flammable liquid and vapour.



GHS08 health hazard

STOT RE 1

H372 Causes damage to organs through prolonged or repeated exposure.

Asp. Tox. 1

H304 May be fatal if swallowed and enters airways.



GHS09 environment

Aquatic Chronic 2 H411 Toxic to aquatic life with long lasting effects.



GHS07

STOT SE 3

H336 May cause drowsiness or dizziness.

2.2 Label elements**Labelling according to Regulation EC No 1272/2008 CLP:**

The product is classified and labelled according to the CLP regulation.

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Hazard pictograms:

GHS02 GHS07 GHS08 GHS09

Signal word: Danger**Hazard-determining components of labelling:**

Hydrocarbons, C9-C12, n-alkanes, isoalkanes, cyclics, aromatics (2-25%)

Hazard statements:

H226 Flammable liquid and vapour.

H336 May cause drowsiness or dizziness.

H372 Causes damage to organs through prolonged or repeated exposure.

H304 May be fatal if swallowed and enters airways.

H411 Toxic to aquatic life with long lasting effects.

Precautionary statements

P102 Keep out of reach of children.

P210 Keep away from heat, hot surfaces, sparks, open flames and other ignition sources. No smoking.

P261 Avoid breathing dust/fume/gas/mist/vapours/spray.

P273 Avoid release to the environment.

P280 Wear protective gloves/protective clothing/eye protection/face protection/hearing protection.

P301+P310 IF SWALLOWED: Immediately call a POISON CENTER/ doctor.

P304+P340 IF INHALED: Remove person to fresh air and keep comfortable for breathing.

P391 Collect spillage.

P403+P233 Store in a well-ventilated place. Keep container tightly closed.

P403+P235 Store in a well-ventilated place. Keep cool.

P405 Store locked up.

P501 Dispose of contents/container in accordance with local/regional/national/international regulations.

Additional information:

EUH066 Repeated exposure may cause skin dryness or cracking.

2.3 Other hazards**Results of PBT and vPvB assessment****PBT:** Not applicable.**vPvB:** Not applicable.* **SECTION 3: Composition/information on ingredients****3.2 Mixtures****Description:** Mixture: consisting of the following components.**Ingredients according Regulation (EU) 2020/878:**

EC number: 919-446-0 Reg.nr.: 01-2119458049-33-XXXX	Hydrocarbons, C9-C12, n-alkanes, isoalkanes, cyclics, aromatics (2-25%) Flam. Liq. 3, H226; STOT RE 1, H372; Asp. Tox. 1, H304; Aquatic Chronic 2, H411; STOT SE 3, H336, EUH066	≥90-<95%
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CAS: 3648-18-8

EINECS: 222-883-3

Index number: 050-031-00-9

dioctyltin dilaurate

 Repr. 1B, H360D; STOT RE 1, H372

≥0.1-<0.3%

SVHC

CAS: 3648-18-8 dioctyltin dilaurate

SECTION 4: First aid measures**4.1 Description of first aid measures****General information:**

Take affected persons out into the fresh air.

Seek immediate medical advice.

After inhalation:

Supply fresh air and to be sure call for a doctor.

In case of unconsciousness place patient stably in side position for transportation.

Seek medical treatment in case of complaints.

After skin contact:

Immediately wash with water and soap and rinse thoroughly.

If skin irritation continues, consult a doctor.

After eye contact:

Rinse opened eye for at least 15 minutes under running water.

Protect unharmed eye.

Seek immediate medical advice.

After swallowing:

Do not induce vomiting; call for medical help immediately.

Drink plenty of water and provide fresh air. Call for a doctor immediately.

Seek immediate medical advice.

4.2 Most important symptoms and effects, both acute and delayed

No further relevant information available.

4.3 Indication of any immediate medical attention and special treatment needed

No further relevant information available.

SECTION 5: Firefighting measures**5.1 Extinguishing media****Suitable extinguishing agents:** CO₂, powder or water spray. Fight larger fires with water spray.**For safety reasons unsuitable extinguishing agents:** Water with full jet**5.2 Special hazards arising from the substance or mixture**

Carbon monoxide (CO)

Carbon dioxide (CO₂)**5.3 Advice for firefighters****Protective equipment:**

Mouth respiratory protective device.

Wear fully protective suit.

Additional information

Collect contaminated fire fighting water separately. It must not enter the sewage system.

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SECTION 6: Accidental release measures**6.1 Personal precautions, protective equipment and emergency procedures:**

Wear protective equipment. Keep unprotected persons away.

Avoid inhalation of vapors.

Wear protective clothing.

Keep away from ignition sources.

6.2 Environmental precautions:

Do not allow to enter sewers/ surface or ground water.

Do not allow to penetrate the ground/soil.

6.3 Methods and material for containment and cleaning up:

Collect with absorbent material (sand, diatomite).

Ensure adequate ventilation.

Absorb liquid components with liquid-binding material.

6.4 Reference to other sections:

See Section 7 for information on safe handling.

See Section 8 for information on personal protection equipment.

See Section 13 for disposal information.

SECTION 7: Handling and storage**7.1 Precautions for safe handling**

No special precautions are necessary if used correctly.

Ensure good ventilation/exhaustion at the workplace.

Information about fire - and explosion protection:

Keep ignition sources away - Do not smoke.

Protect against electrostatic charges.

7.2 Conditions for safe storage, including any incompatibilities**Storage:****Requirements to be met by storerooms and receptacles:**

Store in a cool location.

Store away from sources of ignition

Prevent any seepage into the ground.

Provide ventilation for receptacles.

Further information about storage conditions:

Keep container tightly sealed.

Store in cool, dry conditions in well sealed receptacles.

Protect from heat and direct sunlight.

7.3 Specific end use(s) No further relevant information available.* **SECTION 8: Exposure controls/personal protection****8.1 Control parameters****Ingredients with limit values that require monitoring at the workplace:**

The product does not contain any relevant quantities of materials with critical values that have to be monitored at the workplace.

DNELs

(EC: 919-446-0) Hydrocarbons, C9-C12, n-alkanes, isoalkanes, cyclics, aromatics (2-25%)

Workers - Inhalation, Systemic effects, short-term exposure: 570 mg/m³

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Workers - Hazard via inhalation route Systemic effects Long term exposure: 330 mg/m³

Workers - Hazard via dermal route Systemic effects Long term exposure: 44 mg/kg bw/day

General Population - Hazard via inhalation route Systemic effects Long term exposure: 71 mg/m³

General Population - Hazard via dermal route Systemic effects Long term exposure: 26 mg/kg bw/day

General Population - Hazard via oral route Systemic effects Long term exposure: 26 mg/kg bw/day

8.2 Exposure controls**8.2.1. Appropriate engineering controls** Provide adequate ventilation.**Individual protection measures, such as personal protective equipment****General protective and hygienic measures:**

Keep away from foodstuffs, beverages and feed.

Wash hands before breaks and at the end of work.

Store protective clothing separately.

Do not inhale gases / fumes / aerosols.

Avoid contact with the eyes and skin.

Respiratory protection:

In case of brief exposure or low pollution use respiratory filter device. In case of intensive or longer exposure use self-contained respiratory protective device.

Hand protection

Protective gloves resistant to chemicals (standard EN 374-1)

The glove material has to be impermeable and resistant to the product/ the substance/ the preparation.

Due to missing tests no recommendation to the glove material can be given for the product/ the preparation/ the chemical mixture.

Selection of the glove material on consideration of the penetration times, rates of diffusion and the degradation

Material of gloves

Hand protection when handling the product at room temperature:

Butyl rubber - IIR: thickness $\geq 0,5\text{mm}$; breakthrough time $\geq 480\text{min}$.

Fluorinated rubber - FKM: thickness $\geq 0,4\text{mm}$; breakthrough time $\geq 480\text{min}$.

Recommendation: contaminated gloves should be disposed of.

The selection of the suitable gloves does not only depend on the material, but also on further marks of quality and varies from manufacturer to manufacturer. As the product is a mixture of several substances, the resistance of the glove material can not be calculated in advance and has therefore to be checked prior to the application.

Penetration time of glove material

The determined penetration times according to EN 16523-1:2015 are not performed under practical conditions. Therefore a maximum wearing time, which corresponds to 50% of the penetration time, is recommended.

Eye/face protection

Safety glasses with side-shields (frame goggles) (e.g. EN 166)

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Body protection:

Protective work clothing

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SECTION 9: Physical and chemical properties**9.1 Information on basic physical and chemical properties****General Information**

Physical state	Liquid
Colour:	Clear
Odour:	
Odour threshold:	Not determined
Melting point/freezing point:	Not determined
Flammability	Not applicable
Lower and upper explosion limit	
Lower:	Not determined
Upper:	Not determined
Flash point:	Not Flammable
Auto-ignition temperature:	Product is not selfigniting.
Decomposition temperature:	Not determined
pH	Not determined
Viscosity:	
Kinematic viscosity	Not determined
Kinematic viscosity	
Dynamic at 20 °C:	7 mPas
Solubility	
water:	Not determined
Partition coefficient n-octanol/water (log value)	Not determined
Vapour pressure:	Not determined
Density and/or relative density	
Density at 20 °C:	0.78 g/cm ³
Relative density	Not determined
Vapour density	Not determined

9.2 Other information

Appearance:	
Form:	Liquid
Important information on protection of health and environment, and on safety.	
Auto-ignition temperature:	Not determined
Explosive properties:	Product does not present an explosion hazard.
Solvent content:	
VOC (EC)	740 g/l
Cloud point / clarification point:	
Oxidising properties	Not oxidising
Evaporation rate	Not determined

Information with regard to physical hazard classes

Explosives	Void
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Flammable gases	Void
Aerosols	Void
Oxidising gases	Void
Gases under pressure	Void
Flammable liquids	
Flammable liquid and vapour.	
Flammable solids	Void
Self-reactive substances and mixtures	Void
Pyrophoric liquids	Void
Pyrophoric solids	Void
Self-heating substances and mixtures	Void
Substances and mixtures, which emit flammable gases in contact with water	Void
Oxidising liquids	Void
Oxidising solids	Void
Organic peroxides	Void
Corrosive to metals	Void
Desensitised explosives	Void

SECTION 10: Stability and reactivity**10.1 Reactivity** No further relevant information available.**10.2 Chemical stability****Thermal decomposition / conditions to be avoided** Stable at environment temperature.**10.3 Possibility of hazardous reactions** No dangerous reactions known.**10.4 Conditions to avoid** Avoid heat, sparkles, naked flame or other sources of ignition.**10.5 Incompatible materials** No further relevant information available.**10.6 Hazardous decomposition products** No dangerous decomposition products known.**SECTION 11: Toxicological information****11.1 Information on hazard classes as defined in Regulation (EC) No 1272/2008****Acute toxicity** Based on available data, the classification criteria are not met.**LD/LC50 values relevant for classification:****Hydrocarbons, C9-C12, n-alkanes, isoalkanes, cyclics, aromatics (2-25%)**

Oral LD50 >15,000 mg/kg (rat)

Dermal LD50 >3,400 mg/kg (rat)

Skin corrosion/irritation Based on available data, the classification criteria are not met.**Serious eye damage/irritation** Based on available data, the classification criteria are not met.**Respiratory or skin sensitisation** Based on available data, the classification criteria are not met.**Germ cell mutagenicity** Based on available data, the classification criteria are not met.**Carcinogenicity** Based on available data, the classification criteria are not met.**Reproductive toxicity** Based on available data, the classification criteria are not met.**STOT-single exposure**

The product is classified as Specific Target Organ Toxicity after single exposure Category 3

STOT-repeated exposure

The product is classified as Specific Target Organ Toxicity after repeated exposure Category 1

Aspiration hazard The product is classified Aspiration toxicity Category 1

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11.2 Information on other hazards**Endocrine disrupting properties**

None of the ingredients is listed.

SECTION 12: Ecological information**12.1 Toxicity****Aquatic toxicity:**

(EC: 919-446-0) Hydrocarbons, C9-C12, n-alkanes, isoalkanes, cyclics, aromatics (2-25%)

EC50(96h): 10 - 30 mg/l (Oncorhynchus mykiss)

NOEC(21d): 0,28 mg/l (daphnia magna)

NOEC(28d): 0,13 mg/l (Oncorhynchus mykiss)

EC50 (72h): 4,6-10 mg/l (algae)

EC50 (48h): 10-20 mg/l (daphnia magna)

12.2 Persistence and degradability

Hydrocarbons, C9-C12, n-alkanes, isoalkanes, cyclic, aromatic (2 -25%):

It is 75% biodegradable after 28 days under the conditions of the study and is easily biodegradable.

12.3 Bioaccumulative potential

(EC: 919-446-0) Hydrocarbons, C9-C12, n-alkanes, isoalkanes, cyclics, aromatics (2-25%)

BCF: 10- 2500

Potential: High

12.4 Mobility in soil

Hydrocarbons, C9-C12, n-alkanes, isoalkanes, cyclics, aromatics (2-25%)

It evaporates readily from surface soil and water. It can penetrate soil until reaching ground water, where the most soluble components will spread. Degradation occurs extremely slowly under anaerobic conditions.

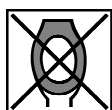
12.5 Results of PBT and vPvB assessment**PBT:** Not applicable.**vPvB:** Not applicable.**12.6 Endocrine disrupting properties** For information on endocrine disrupting properties see section 11.**12.7 Other adverse effects****Remark:** Toxic for fish**Additional ecological information:****General notes:**

Also poisonous for fish and plankton in water bodies.

The product contains materials that are harmful to the environment.

SECTION 13: Disposal considerations**13.1 Waste treatment methods****Recommendation**

Dispose according to National Regulations.



Must not be disposed together with household garbage. Do not allow product to reach sewage system.

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Uncleaned packaging:**Recommendation:** Disposal must be made according to official regulations.**SECTION 14: Transport information****14.1 UN number or ID number****ADR, IMDG, IATA**

UN1866

14.2 UN proper shipping name**ADR**1866 RESIN SOLUTION, ENVIRONMENTALLY
HAZARDOUS**IMDG****IATA**RESIN SOLUTION, MARINE POLLUTANT
RESIN SOLUTION**14.3 Transport hazard class(es)****ADR, IMDG****Class**

3 Flammable liquids.

Label

3

IATA**Class**

3 Flammable liquids.

Label

3

14.4 Packing group**ADR, IMDG, IATA**

III

14.5 Environmental hazards:**Marine pollutant:**

Environmental Hazardous

Yes

Symbol (fish and tree)

Symbol (fish and tree)

Warning: Flammable liquids.

Special marking (ADR):**14.6 Special precautions for user****Hazard identification number (Kemler code):**

30

EMS Number:F-E,S-E**Stowage Category**

A

14.7 Maritime transport in bulk according to IMO instruments

Not applicable.

Transport/Additional information:**ADR****Limited quantities (LQ)**

5L

Excepted quantities (EQ)

Code: E1

Maximum net quantity per inner packaging: 30 ml

Maximum net quantity per outer packaging: 1000 ml

Transport category

3

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Tunnel restriction code

D/E

IMDG**Limited quantities (LQ)**

5L

Excepted quantities (EQ)

Code: E1

Maximum net quantity per inner packaging: 30 ml

Maximum net quantity per outer packaging: 1000 ml

UN "Model Regulation":

UN 1866 RESIN SOLUTION, 3, III,

ENVIRONMENTALLY HAZARDOUS

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SECTION 15: Regulatory information**15.1 Safety, health and environmental regulations/legislation specific for the substance or mixture**

REACH Regulation 1907/2006/EC

Regulation (EU) 2020/878

CLP Regulation 1272/2008/EC

Directive 98/24/EC on the protection of health and safety of workers from the risks related to chemicals agents at work.

Council Directive 94/33/EC on the protection of young people at work, as amended.

Directive 92/85/EEC on the introduction of measures to encourage improvements in the safety and health at work of pregnant workers and workers who have recently given birth or are breastfeeding, as amended

Directive 2012/18/EU**Named dangerous substances - ANNEX I** Substance is not listed.**Seveso category**

E2 Hazardous to the Aquatic Environment

P5c FLAMMABLE LIQUIDS

Qualifying quantity (tonnes) for the application of lower-tier requirements 200 t**Qualifying quantity (tonnes) for the application of upper-tier requirements** 500 t**REGULATION (EC) No 1907/2006 ANNEX XVII** Conditions of restriction: 3**National regulations:****Information about limitation of use:**

Workers are not allowed to be exposed to this hazardous material. Exceptions can be made by the authorities in certain cases.

Workers are not allowed to be exposed to the hazardous carcinogenic materials contained in this preparation. Exceptions can be made by the authorities in certain cases.

Other regulations, limitations and prohibitive regulations**Substances of very high concern (SVHC) according to REACH, Article 57**

It doesn't contain substances of very high concern (SVHC).

15.2 Chemical safety assessment: A Chemical Safety Assessment has not been carried out.**SECTION 16: Other information**

This information is based on our present knowledge. However, this shall not constitute a guarantee for any specific product features and shall not establish a legally valid contractual relationship.

Relevant phrases

H226 Flammable liquid and vapour.

H304 May be fatal if swallowed and enters airways.

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H336 May cause drowsiness or dizziness.
H360D May damage the unborn child.
H372 Causes damage to organs through prolonged or repeated exposure.
H411 Toxic to aquatic life with long lasting effects.
EUH066 Repeated exposure may cause skin dryness or cracking.

Department issuing SDS:

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Version number of previous version: 3**Abbreviations and acronyms:**

ADR: Accord relatif au transport international des marchandises dangereuses par route (European Agreement Concerning the International Carriage of Dangerous Goods by Road)
IMDG: International Maritime Code for Dangerous Goods
IATA: International Air Transport Association
GHS: Globally Harmonised System of Classification and Labelling of Chemicals
EINECS: European Inventory of Existing Commercial Chemical Substances
ELINCS: European List of Notified Chemical Substances
CAS: Chemical Abstracts Service (division of the American Chemical Society)
VOC: Volatile Organic Compounds (USA, EU)
DNEL: Derived No-Effect Level (REACH)
LC50: Lethal concentration, 50 percent
LD50: Lethal dose, 50 percent
PBT: Persistent, Bioaccumulative and Toxic
SVHC: Substances of Very High Concern
vPvB: very Persistent and very Bioaccumulative
Flam. Liq. 3: Flammable liquids – Category 3
Repr. 1B: Reproductive toxicity – Category 1B
STOT SE 3: Specific target organ toxicity (single exposure) – Category 3
STOT RE 1: Specific target organ toxicity (repeated exposure) – Category 1
Asp. Tox. 1: Aspiration hazard – Category 1
Aquatic Chronic 2: Hazardous to the aquatic environment - long-term aquatic hazard – Category 2

*** Data compared to the previous version altered.**

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